

WHAT IS CLAIMED IS

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1. An image processing system comprising a client apparatus connected with a communication network, wherein:

the client apparatus comprises:

10 a storing part storing a code which is obtained by reversibly compressing and coding an image according to a predetermined coding way having a hierarchy configuration from a reversible part through a non-reversible part;

15 an altering part generating, from the code, a non-reversible code;

a transmission part transmitting the either reversible or non-reversible code, or the image itself obtained from decoding the same code, to a predetermined
20 transmission destination; and

a selecting part selectively performing transmission of the non-reversible code or the reversible code, or the image obtained therefrom.

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2. The image processing system as claimed in claim 1, wherein:

the coding way comprises a method according to JPEG 2000.

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3. The image processing system as claimed in claim 1, wherein:

said selecting part applies the image data in the form of non-reversible code when the data is displayed with a use of the code and therewith operation of editing or modifying is performed on the image data, while it applies the image data in the form of reversible code when it is transmitted to external apparatus via the communication network.

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4. The image processing system as claimed in claim 1, wherein:

the selecting part transmits the reversible code having information indicating the contents of

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operation of editing or modifying the image data
attached thereto.

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5. The image processing system as claimed in
claim 1, wherein:

the client apparatus comprises a determining
10 part for determining whether the contents of operation
of editing or modifying for the image data are actually
reflected on the image data in the form of reversible
code or the original image by the own apparatus or by
another externally apparatus; and

15 the selecting part, when a determination is
made by said determining part that the contents of
operation of editing or modifying for the image data are
actually reflected on the image data in the form of
reversible code or the original image by another
20 external apparatus, transmits the reversible code having
information indicating the contents of operation of
editing or modifying the image data attached thereto.

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6. The image processing system as claimed in claim 1, further comprising a server apparatus which is also connected with the predetermined communication network,

5 wherein:

 when receiving information indicating the contents of operation of editing or modifying the image data attached, the server apparatus performs processing of actually reflecting the contents of operation of
10 editing or modifying on the image data in the form of reversible code or the original image according to the information thus received.

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7. An image forming apparatus comprising:
a coding part reversibly compressing and coding an image according to a predetermined coding way
20 having a hierarchy configuration from a reversible part through a non-reversible part;
a storing part storing the code;
a decoding part decoding the code;
a printer engine performing image formation on
25 a medium based on the decoded image;

an altering part generating a non-reversible code from the code stored;

a transmission part transmitting the either reversible or non-reversible code, or the data of image
5 obtained from decoding the code by said decoding part, to a predetermined transmission destination; and

a selecting part selectively performing transmission of the image data in the form of non-reversible code or in the form of reversible code thus
10 generated, or the code itself.

15 8. The image forming apparatus as claimed in claim 7, wherein:

said selecting part transmits the image data in the form of reversible code when it is provided to the printer engine.

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9. The image forming apparatus as claimed in
25 claim 7, wherein:

said selecting part transmits the image data
in the form of non-reversible code when it is used for
displaying the image data on a display device of either
another external apparatus or in the own apparatus for
5 the purpose of performing an operation of editing or
modifying the image data.

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10. The image forming apparatus as claimed in
claim 7, wherein:

said coding part applies a method according to
JPEG 2000 for the predetermined coding way.

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11. The image forming apparatus as claimed in
20 claim 1, further comprising an image input device
reading an original image, wherein:

said coding part performs the compression and
coding on an image read in by said image input part.

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12. A computer readable program causing a computer to perform:

5 a storing step of storing a code which is obtained by reversibly compressing and coding an image according to a predetermined coding way having a hierarchy configuration from a reversible part through a non-reversible part;

an altering step of generating, from the code, a non-reversible code;

10 a transmission step of transmitting the either reversible or non-reversible code, or the image obtained from decoding the code, to a predetermined transmission destination; and

15 a selecting step of selectively performing transmission of the non-reversible code or the reversible code, or the image obtained therefrom.

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13. The computer readable program as claimed in claim 12, wherein:

in said selecting step, the image data in the form of reversible code is transmitted when it is
25 provided for being used for printing processing.

14. The computer readable program as claimed
in claim 12, wherein:

in said selecting step, the image data in the
form of non-reversible code is transmitted when it is
5 used for displaying the image data in a display device
for the purpose of performing an operation of editing or
modifying the image data.

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15. The computer readable program as claimed
in claim 12, wherein:

in said altering step, a method according to
15 JPEG 2000 is applied for the predetermined coding way.

20 16. A computer readable information recording
medium storing therein the program claimed in claim 12.

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17. A computer readable information recording medium storing therein the program claimed in claim 13.

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18. A computer readable information recording medium storing therein the program claimed in claim 14.

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19. A computer readable information recording medium storing therein the program claimed in claim 15.

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20. An image processing method comprising:
20 a storing step of storing a code which is obtained by reversibly compressing and coding an image according to a predetermined coding way having a hierarchy configuration from a reversible part through a non-reversible part;
25 an altering step of generating, from the code,

a non-reversible code;

a transmission step of transmitting the either
reversible or non-reversible code, or the image obtained
from decoding the code, to a predetermined transmission
5 destination; and

a selecting step of selectively performing
transmission of the non-reversible code or the
reversible code, or the image obtained therefrom.

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21. The image processing method as claimed in
claim 20, wherein:

15 in said selecting step, the image data in the
form of reversible code is transmitted when it is
provided for being used for printing processing.

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22. The image processing method as claimed in
claim 20, wherein:

in said selecting step, the image data in the
25 form of non-reversible code is transmitted when it is

used for displaying the image data in a display device
for the purpose of performing an operation of editing or
modifying the image data.

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23. The image processing method as claimed in
claim 20, wherein:

10 in said altering step, a method according to
JPEG 2000 is applied for the predetermined coding way.

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24. An image processing method using a client
apparatus connected with a communication network,
wherein:

the client performs:

20 a storing step of storing a code which is
obtained by reversibly compressing and coding an image
according to a predetermined coding way having a
hierarchy configuration from a reversible part through a
non-reversible part;

25 an altering step of generating, from the code,

a non-reversible code;

a transmission step of transmitting the either
reversible or non-reversible code, or the image obtained
from decoding the code, to a predetermined transmission
5 destination; and

a selecting step of selectively performing
transmission of the non-reversible code or the
reversible code, or the image obtained therefrom.

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25. The image processing method as claimed in
claim 24, wherein:

15 in said altering step, a method according to
JPEG 2000 is applied for the predetermined coding way.

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26. The image processing method as claimed in
claim 24, wherein:

in said selecting step, the image data in the
form of non-reversible code is performed when, in the
25 client apparatus, the image data is displayed with a use.

of the generated code thus transmitted, and therewith,
operation of editing or modifying is performed on the
image data.

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27. The image processing method as claimed in
claim 24, wherein:

10 in said selecting step, the reversible code
having information indicating the contents of operation
of editing or modifying the image data attached thereto
is transmitted.

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28. The image processing method as claimed in
claim 24, wherein:

20 the client apparatus performs a determining
step of determining whether the contents of operation of
editing or modifying for the image data are actually
reflected on the image data in the form of reversible
code or the original image by the own apparatus or by
25 another externally apparatus; and

in the selecting step, when a determination is made in said determining step that the contents of operation of editing or modifying for the image data are actually reflected on the image data in the form of reversible code or the original image by another externally apparatus, the reversible code having information indicating the contents of operation of editing or modifying for the image data attached thereto is transmitted.

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29. The image processing method as claimed in claim 24, wherein:

when information indicating the contents of operation of editing or modifying the image data is received in a server apparatus which is also connected with the predetermined communication network from the client apparatus, processing of actually reflecting the contents of operation of editing or modifying on the image data in the form of reversible code or the original image according to the information thus received is performed.

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